

REMARKS

35 U.S.C § 103

The examiner rejected Claims 1-10, 13-2, and 24-26 under 35 U.S.C. 103(a), as being unpatentable over Abbasi, US 6,786,863, in view of Yee, US 6,016,385, and in further view of Biocca et al., US 2002/0080094.

Claim 1, as amended, calls for a virtual reality encounter system includes “a mannequin; a camera coupled to the mannequin...; a processor...; an adapter to send the morphed, first video image signal to a communications network and receive a second, video image signal from the communications network, the second video image signal of a second, different physical location; and a set of goggles to render the second video image of the second, different physical location on a pair of displays that are integrated with the set of goggles.”

The examiner states on page 6 of Office Action that:

Neither Abbasi nor Yee describe that the image acquired by the camera but do not describe wherein the image is morphed or overlays the image on a virtual scene. However, Biocca teaches a teleportal system to provide remote communication to a plurality of users, wherein a process that receives a first video image signal, morphs the first video image signal and sends the morphed image signal to a second, physical location to be displayed (column 9, line 65-column 10, line 6); and wherein the processor overlays a virtual environment over one or more portions of the video image to form a virtual scene (figures 1 and 12B, 12C). It would have been obvious to one of the ordinary skill in the robotic and communication arts, to morph the acquired image because as Biocca suggests, morphing the image and overlaying the image allows the image to be perceived in a user preferred 3D or stereoscopic view that gives a more realistic view of the second location ([0038]-[0039]). (emphasis added)

Applicant contends that amended claim 1 is distinct over any purported combination of Abbasi, Yee, and Biocca because the alleged combination neither describes nor suggests that “a set of goggles to render the second video image of the second, different physical location on a pair of displays that are integrated with the set of goggles.” The examiner readily admits neither Abbasi nor Yee describes image is morphed or overlays image on a virtual scene¹, but relies on the discussions in Biocca from col. 9, line 65 to col. 10, line 6 for its alleged disclosure of this feature (reproduced below).

¹ Final Office Action, page 6.

13. The head mounted display unit of claim 1 wherein the first and second augmented-reality displays generate a stereoscopic image to the eyes of the user.

14. The head mounted display unit of claim 1 further comprising a computer network, wherein the image data receiving unit operably receives image data from the remote location via the computer network.

15. The head mounted display unit of claim 1 wherein the retro-reflective material is at least 98 percent reflective.

In addition, the examiner states in "Response to Arguments" that: **"Figures 1 and 3 of Biocca show that the display located on the user's head, the goggles 105, comprise the projective display 401. Even though Biocca may require the additional screen, this does not teach away from the combination or the claimed invention as the additional screen and/or the teleportal sites are different remote locations and the claim language does not explicitly exclude further system elements from being utilized. The 'mere existence of differences between the prior art and an invention does not establish the invention's nonobviousness.' Dann v. Johnston, 425 U.S. 219, 230, 189 USPQ 257, 261 (1976)."**

Applicant contends that the projective display 401 in Biocca does not render images on a pair of displays that are integrated with the set of goggles, as required by amended claim 1. In Biocca, projective display 401 refers to a set of elements as shown in Figure 3 including a source display, a beamsplitter and a projection lens. In order for a user to perceive any image, Biocca **must** require retro-reflective screens which are not part of the headset or goggles to display images. In this regard, Biocca explicitly describes in paragraph [0032] that the teleportal system (as shown in Figure 1) requires a screen 103 made of a retro-reflective material to be built around a user as four walls and a ceiling, because this particular material can reflect light projected onto its surface and then to the eyes of the user such that images become visible to the user. For a more specific illustration of the technique, Biocca set forth a "magic mirror" configuration of the teleportal site in paragraph [0048] in which the user can hold a surface 714 covered by retro-reflective fabric to view images projected by the projective display of the head set 105. These teachings in Biocca neither describe nor suggest a pair of displays that are integrated with the set of goggles. Therefore, Claim 1 is allowable over Abbasi in view of Yee and further in view of Biocca at least for these reasons.

Claim 15, as amended, recites similar features of claim 1 and is allowable for analogous reasons discussed in claim 1.

Claim 2-10, 13-14, 16-21, and 24-26 are allowable at least for the reasons discussed in claim 1.

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The examiner rejected claims 11, 12, 22, and 23 under 35 U.S.C. 103(a), as being unpatentable over Abbasi in view of Yee and Biocca as applied to claims 7 and 20 above, and further in view of Simmons, US 2003/0030397.

The examiner argues that:

Neither Abbasi, Yee nor Biocca teach that the body of the robot includes that the cameras are positioned in the eye sockets and the microphone of the robot is positioned in the ear canal. However, Simmons teaches a system and method of controlling a robot remotely, wherein the robot is a humanoid robot (figure 5); the robot includes an eye socket and the camera is positioned in the eye socket ([0026]); and the robot includes an ear canal wherein the microphone is positioned in the ear canal ([0016]). It would be obvious to one of ordinary skill in the art to combine the inventions of Biocca in view of Yee with the teachings of Simmons because as Simmons teaches, placing the sensors in the position corresponding to the human sensors aligns the sensors to the perspective of the use and better reflects the environment to the perspective of the user ([0026]).

Claims 11, 12, 22 and 23 depend indirectly from their respective base claims 1 and 15. Simmons neither describes nor suggests the claimed features in claims 1 and 15. Therefore, claims 11, 12, 22 and 23 are allowable at least for the reasons discussed in claims 1 and 15.

All of the dependent claims are patentable for at least the reasons for which the claims on which they depend are patentable.

Any circumstance in which the Applicant has (a) addressed certain comments of the examiner does not mean that the applicant concedes other comments of the examiner, (b) made arguments for the patentability of some claims does not mean that there are not other good reasons for patentability of those claims and other claims, or (c) amended or canceled a claim does not mean that the applicant concedes any of the examiner's positions with respect to that claim or other claims.

In view of the foregoing, Applicant respectfully requests entry of the amendment since it addresses specific objections first raised by the examiner in the instant office action, does not require any further consideration or search. Accordingly, Applicant submits that the application is in condition for allowance and such action is respectfully requested at the examiner's earliest convenience.

Applicant : Raymond Kurzweil
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Please apply any other charges or credits to deposit account 06-1050.

Respectfully submitted,

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/Denis G. Maloney/
Denis G. Maloney
Reg. No. 29,670

Fish & Richardson P.C.
225 Franklin Street
Boston, MA 02110
Telephone: (617) 542-5070
Facsimile: (877) 769-7945

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